

Patent claims

1. An orthosis with
 - 5 - a first bar (2) which can be fastened to a first body part,
 - a second bar (3) which can be fastened to a second body part,
 - a bar hinge (4) for pivotable connection of the
 - 10 first and second bars (2, 3),
 - at least one click-stop dial (14, 15) which is rotatable about a pivot axis (102), can be blocked in different rotation positions and is used for adjusting a pivot range limit, and
 - 15 - a fixing device for blocking the click-stop dials (14, 15),characterized in that the fixing device has a locking disk (16) which is displaceable in the direction of the pivot axis (102), is mounted in a rotationally fixed manner in relation to the first bar (2) and can be moved, by being displaced, between a blocking position, in which the locking disk (16) engages radially over the click-stop dial (14, 15) and is in locked form-fit engagement with said click-stop dial (14, 15), and a release position, in which the locking disk (16) is disengaged from the click-stop dial (14, 15).
2. The orthosis as claimed in claim 1, characterized in that the click-stop dial (14, 15) has an outer tothing (50), and the locking disk (16) has an inner tothing (61) which can be moved into and out of meshing engagement with the outer tothing (50) of the click-stop dial (14, 15).
3. The orthosis as claimed in claim 1 or 2, characterized in that the locking disk (16) has a

thread (63) and can be moved in the manner of a spindle via the thread (63).

4. The orthosis as claimed in one of the preceding
5 claims, characterized in that the locking disk
(16) has a thread (63) on its radial outer
circumferential surface, and in that the fixing
device has an axially fixed rotation part (18)
10 which radially surrounds the locking disk (16) and
has an internal thread (64), which rotation part
engages with the thread (63) of the locking disk
(16) and, when rotated, causes an axial
displacement of the locking disk (16).
- 15 5. The orthosis as claimed in one of the preceding
claims, characterized in that two click-stop dials
(14, 15) are provided for adjusting the pivot
range limits in the extension direction and
flexion direction, said click-stop dials (14, 15)
20 being arranged parallel and next to one another
and being able to be blocked simultaneously by the
same locking disk (16).
- 25 6. The orthosis as claimed in claim 5, characterized
in that the fixing device is designed in such a
way that, by displacing the locking disk (16) in
one direction, the extension click-stop dial (14)
is released, and, by displacing the locking disk
(16) in the opposite direction, the flexion click-
30 stop dial (15) is released.
7. The orthosis as claimed in one of the preceding
claims, characterized in that the bar hinge (4)
has a housing (12) fixedly connected to the first
35 bar (2) and with a circumferential wall (38)
partially surrounding the locking disk (16), in
that the locking disk (16) has radial projections
(62), and in that the peripheral wall (38) is
provided with slits (37) through which the radial

projections (62) are guided in order to prevent rotation of the locking disk (16).

- 5 8. The orthosis as claimed in claim 7, characterized
in that the housing (12) has a central sleeve
portion (39) designed as a rotation bearing for
the at least one click-stop dial (14, 15), in that
a spring force mechanism is provided in order to
pretension the second bar (3) relative to the
10 first bar (2) both in the extension direction and
in the flexion direction, and in that a dead-point
adjustment device for the spring force mechanism
is mounted rotatably inside the sleeve portion
(39).
- 15 9. The orthosis as claimed in claim 8, characterized
in that the dead-point adjustment mechanism
comprises a rotation block (20) in which a
blocking pin (34) is displaceably guided
20 transversely with respect to the pivot axis (102),
in that the housing (12) has a plurality of radial
blocking bores (46) which are spaced apart in the
circumferential direction of the housing (12), and
in that an eccentric part (33) is mounted
25 rotatably inside the rotation block (20) in order
to keep the blocking pin (34) in engagement with a
blocking bore (46) or to permit removal of the
blocking pin (34) from the blocking bore (46).
- 30 10. The orthosis as claimed in claim 9, characterized
in that the rotation block (20) of the dead-point
adjustment mechanism is designed as a rotation
bearing for the second bar (3).